

**Translation**

Rec'd PCT/PTO 30 DEC 2004 10/520019  
PCT/EP2003/006073

PATENT COOPERATION TREATY

**PCT**

10/520019

**INTERNATIONAL PRELIMINARY EXAMINATION REPORT**

(PCT Article 36 and Rule 70)

Applicant's or agent's file reference B 1207	<b>FOR FURTHER ACTION</b> See Notification of Transmittal of International Preliminary Examination Report (Form PCT/IPEA/416)	
International application No. PCT/EP2003/006073	International filing date (day/month/year) 10 June 2003 (10.06.2003)	Priority date (day/month/year) 02 July 2002 (02.07.2002)
International Patent Classification (IPC) or national classification and IPC B60S 1/02, G01N 25/68		
Applicant BARTEC GMBH		

1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36.

2. This REPORT consists of a total of 6 sheets, including this cover sheet.

☒ This report is also accompanied by ANNEXES, i.e., sheets of the description, claims and/or drawings which have been amended and are the basis for this report and/or sheets containing rectifications made before this Authority (see Rule 70.16 and Section 607 of the Administrative Instructions under the PCT).

These annexes consist of a total of 12 sheets.

3. This report contains indications relating to the following items:

- I ☒ Basis of the report
- II ☐ Priority
- III ☐ Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
- IV ☐ Lack of unity of invention
- V ☒ Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
- VI ☐ Certain documents cited
- VII ☐ Certain defects in the international application
- VIII ☐ Certain observations on the international application

Date of submission of the demand 02 February 2004 (02.02.2004)	Date of completion of this report 11 January 2005 (11.01.2005)
Name and mailing address of the IPEA/EP	Authorized officer
Facsimile No.	Telephone No.

## INTERNATIONAL PRELIMINARY EXAMINATION REPORT

International application No.

PCT/EP2003/006073

## I. Basis of the report

## 1. With regard to the elements of the international application:\*

- ☐ the international application as originally filed
- ☒ the description:  
pages \_\_\_\_\_, 2, 8-13 \_\_\_\_\_, as originally filed  
pages \_\_\_\_\_, filed with the demand  
pages \_\_\_\_\_, 1, 3, 3a, 4, 4a, 5-7 \_\_\_\_\_, filed with the letter of \_\_\_\_\_ 02 June 2004 (02.06.2004)
- ☒ the claims:  
pages \_\_\_\_\_, as originally filed  
pages \_\_\_\_\_, as amended (together with any statement under Article 19  
pages \_\_\_\_\_, filed with the demand  
pages \_\_\_\_\_, 1-11 \_\_\_\_\_, filed with the letter of \_\_\_\_\_ 02 June 2004 (02.06.2004)
- ☒ the drawings:  
pages \_\_\_\_\_, 1/1 \_\_\_\_\_, as originally filed  
pages \_\_\_\_\_, filed with the demand  
pages \_\_\_\_\_, filed with the letter of \_\_\_\_\_
- ☐ the sequence listing part of the description:  
pages \_\_\_\_\_, as originally filed  
pages \_\_\_\_\_, filed with the demand  
pages \_\_\_\_\_, filed with the letter of \_\_\_\_\_

## 2. With regard to the language, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language \_\_\_\_\_ which is:

- ☐ the language of a translation furnished for the purposes of international search (under Rule 23.1(b)).
- ☐ the language of publication of the international application (under Rule 48.3(b)).
- ☐ the language of the translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

## 3. With regard to any nucleotide and/or amino acid sequence disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- ☐ contained in the international application in written form.
- ☐ filed together with the international application in computer readable form.
- ☐ furnished subsequently to this Authority in written form.
- ☐ furnished subsequently to this Authority in computer readable form.
- ☐ The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
- ☐ The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. ☐ The amendments have resulted in the cancellation of:

- ☐ the description, pages \_\_\_\_\_
- ☐ the claims, Nos. \_\_\_\_\_
- ☐ the drawings, sheets/fig \_\_\_\_\_

5. ☐ This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed, as indicated in the Supplemental Box (Rule 70.2(c)).\*\*

\* Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to this report since they do not contain amendments (Rule 70.16 and 70.17).

\*\* Any replacement sheet containing such amendments must be referred to under item 1 and annexed to this report.

**V. Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement****1. Statement**

Novelty (N)	Claims	1-9	YES
	Claims	10, 11	NO
Inventive step (IS)	Claims	1-9	YES
	Claims	10, 11	NO
Industrial applicability (IA)	Claims	1-11	YES
	Claims		NO

**2. Citations and explanations**

Reference is made to the following documents:

D1: WO 02/04239 A (VOLVO TEKNISK UTVECKLING AB;  
SVENSSON MAGNUS (SE); MAARDBERG BJOER)  
17 January 2002 (2002-01-17)

D2: US-A-4 693 172 (HARVEY CHARLES P) 15 September  
1987 (1987-09-15)

D3: EP-A-0 866 330 (NIPPON SHEET GLASS CO LTD)  
23 September 1998 (1998-09-23)

1. D1, which is considered to be the closest prior art, discloses (cf. page 4, lines 14 to 32; and page 7, lines 5 to 14) a sensor unit from which the subject matter of claim 1 differs in that the dew point sensor is a sensor where the measurement principle used is the change in luminous reflectance when the gas condenses on a measuring surface and in that the temperature sensor, the dew point sensor and the control unit are accommodated in a common housing.

The subject matter of claim 1 is therefore novel (PCT Article 33(2)).

- 1.1 The problem addressed by the present invention can

therefore be considered that of ensuring that the measuring signal of the dew point sensor is largely unaffected by any contamination on the measuring surface and that the sensor unit is accommodated in a common housing. Although dew point sensors of this kind are known (see D3), the prior art does not disclose the use of a general housing for sensor units of this kind. Since the solution cannot be considered obvious, the subject matter of claim 1 of the present application involves an inventive step (PCT Article 33(3)).

- 1.2 The same reasoning applies to independent claim 6 accordingly.
2. Claims 2 to 5 and 7 to 9 are dependent on claims 1 and 6 and therefore likewise satisfy the PCT novelty and inventive step requirements.
3. D1 is considered to be the prior art closest to the subject matter of claim 10. Said document discloses (the references in parentheses relate to D1):

A method for avoiding condensation of a gas, especially water vapour, having the following steps:

- measurement of an object temperature (page 4, lines 14 to 16)
- determination of a dew point of the gas in an atmosphere surrounding the object (page 4, lines 25 to 32)
- increase in the object temperature and/or reduction in the dew point to prevent the object temperature falling to or below the dew point (page 4, lines 14 to 23)

- noncontact measurement of the object temperature  
(page 7, lines 5 to 14).

- 3.1 The subject matter of claim 10 therefore differs from the known method in that the dew point sensor is a sensor where the measurement principle used is the change in luminous reflectance when the gas condenses on a measuring surface.
- 3.2 The problem addressed by the present invention can therefore be considered that of ensuring that the measuring signal of the dew point sensor is largely unaffected by any contamination on the measuring surface.
- 3.3 The solution proposed in claim 10 of the present application cannot be regarded as inventive (PCT Article 33(3)) for the following reasons:
- 3.4 D3 discloses a dew point sensor where the change in luminous reflectance is used as measuring signal. If a person skilled in the art wished to achieve the same aim in a device as per document D1, he could easily apply these features to like effect to the subject matter of D1. In this way he would arrive at a sensor unit as per claim 10 without thereby being inventive.
4. Dependent claim 11 does not contain any features which in combination with the features of any claim to which it refers back satisfy the PCT novelty and inventive step requirements (see D1 to D3 and the appropriate passages cited in the search report).